A Broader Theoretical Model for Feedback in Ambulatory Care

C. SCOTT SMITH1,2, CHRIS FRANCOVICH1, JANET GIESELMAN1 and MARK SERVIS1,3

1Northwest Regional Faculty Development Center, Boise VAMC, Boise, ID, USA; 2University of Washington, Seattle, WA, USA; 3University of California, Davis, CA, USA (Send correspondence to: C. Scott Smith, MD, Medicine (111), Boise VA Medical Center, 500 W. Fort St., Boise, ID, 83702, USA; E-mail: csmith@micron.net)

Abstract. Ask faculty if they provide feedback and they will likely reply “Sure, it’s important, I do it all the time”. Ask medical students if they receive feedback and they may say, “We hardly ever get it”. Ask most residents if they receive feedback and you get “Rarely, but it’s not that helpful anyway”. How is it that these perceptions are so strikingly different? Can they be talking about the same thing? If we wish to improve the educational value of feedback, we must understand these differences. One useful clue is provided by the adage “do as I say, not as I do”. This saying suggests that there are two types of feedback: that which we can measure against a standard and describe (traditional feedback), and that which comes from being immersed in real situations (situated feedback). This dichotomy is a useful construct from which to understand feedback.

Key words: ambulatory training, feedback, knowledge, relationships, situated learning, systems theory

Introduction

Faculty, students and residents have significantly different perceptions about the frequency with which feedback is given and its value (Gill et al., 1984; Bucher and Stelling, 1977). While feedback is an integral part of learning, it is considered difficult to give and, often, more difficult to receive. The theoretical model presented here sheds light on these differences by examining two models of feedback: traditional feedback and situated feedback. While the separation is somewhat artificial, in that we probably use both models in most teaching situations, it nevertheless allows identification of barriers and missed opportunities for effective feedback.

A Broader Theory of Feedback

All feedback begins where the practice of medicine begins, with the learner-patient interaction. Exploration of this interaction may be initiated using an open-ended request such as “tell me about the visit”. Learner-centered interviewing techniques
(head nod, saying “O.K.”) are used to encourage further disclosure. Targeted questions such as “What surprised you most about the visit?”, “Do you know what to do next and how to do it?”, and “How are things going with Mr. Jones?” may be used to draw out specific learner needs.

I. CLINICAL SKILLS

Clinical learning is based on patient care, which requires specific skills (observable physical or psychological behaviors) to be proficient. In analyzing a learner’s needs, faculty begins by assessing the learner’s performance of these skills. Skill performance can by inferred during the exploration of the learner-patient interaction described above or may need to be observed directly. Skills are fundamental and, if they are deficient, this must be the focus of the interaction. Proficiency in any skill requires an image of excellent performance followed by practice. Excellent performance can be role modeled or demonstrated either directly or using educational materials (e.g., videotapes, diagrams). Practice may occur with patients or with surrogates (e.g., intubation dummies, role-plays).

Ambulatory medicine involves the messiness and unpredictability of immediate patient care as well as the logical reconstruction and analysis that occur during reflection on practice. If clinical skills are proficient, then the faculty should decide whether the learner is best served by focusing further on relationships or knowledge. Answering the question “will the learner be best served by exploring the patient interaction in more detail (relationships) or by learning how I think about this problem (knowledge)?” can help guide this decision.

II. RELATIONSHIPS

The major components of ambulatory care relationships (between learner and either patient, staff or faculty) are defined as trust, respect, mutual commitment and the joint negotiation of meaning. Relationships are improved through in-depth examination of the assumptions, behaviors and natural consequences displayed by all involved parties. They are discussed in the section on situated feedback below.

III. KNOWLEDGE

For the purpose of this paper, knowledge will be defined as the currently accepted model for predicting what to do next. This definition emphasizes four points, that knowledge is dynamic and changes with time, that knowledge is negotiated within a community, that knowledge is an abstract simplification of practice, and that clinical knowledge is future-oriented. How to improve learner knowledge will be discussed in the section on traditional feedback below.

The Traditional Model of Feedback

Most medical educators, when asked about feedback, identify with the traditional model. Traditional feedback, well summarized by Ende (1983), derives largely from work that has been done in personnel management, group dynamics and education. The three major components of traditional feedback are:

- Observation by a faculty member. This means first hand, direct faculty observation of specific learner behaviors. It requires that some feature of the performance can be focused on in isolation.
- Evaluation of the observed performance relative to a goal or reference standard. This process relies on objectively agreed upon standards that can be simply and succinctly specified with language.
- Communication of the perceived performance gaps to the learner. Appropriate specificity and timing of the feedback, and the use of communication styles that avoid defensiveness and facilitate receptivity are important during this final component of the traditional feedback process.

The traditional model of feedback is best used with inexperienced learners, to improve knowledge, or with an un笛finitized new patient compliant. A useful formulation of traditional feedback for the busy clinic is the "one-minute preceptor" (Neher et al., 1992) listed in Table I. In this model, there is no direct observation. Steps one and two coincide with evaluation, and steps three through five to communication about performance.

Behaviors and relationships in the ambulatory setting become more complex over time and with experience. While traditional feedback is useful and familiar, it loses its effectiveness as learners interact with increasingly complex problems (Butler and Winne, 1995).

The Situated Model of Feedback

Traditional feedback is actually a subset of the feedback we all receive – continuous feedback from our environment. The situated model, as its name implies, focuses in detail on what it is actually like for the learner and the patient to participate in the situation. The goal of the model is to help learners develop an overall attentiveness to the dynamics of daily practice. To achieve this goal, the patient's subjective experience of illness, the learner's subjective experience of the patient, and significant contextual features are explored. Although objectively defined standards can guide practice, they typically begin to break down in the care of a specific patient. With situated feedback, it is not the faculty's generalized standards but, rather, the actual thoughts, emotions and experience of the patient and the learner, and the outcomes of clinical actions that provide the feedback. Faculty shift from an expert to a coach role, providing focus and another lens for interpreting experience.
Situated feedback has its roots in general systems theory (a model found in engineering, organizational development and family therapy). Systems thinking focuses on actions, relationships and outcomes. To understand the system, the focus must be on synthesis, not analysis. On dynamic relationships, not oversimplified linear causal models.

Training programs oriented toward the situated model of feedback might utilize the following techniques with their learners: use of situation-probing questions by faculty; sharing of personal experiences where the provider improved care by understanding the patient’s point of view; providing information from the patient’s point of view directly to learners (such as survey data or exit interviews); utilization of information systems that supply data regarding the outcomes of important clinical actions; and provision of protected time and resources for guided reflection on the context of the clinical situation (such as providing audio or video taped interviews).

A useful formulation of the situated model of feedback for the busy clinic is seen in Table II.

**Strengths and Weaknesses of Each Model**

Traditional feedback relies on objectively agreed upon standards that can be logically specified with language. It works best when: 1) the learner has not yet had much direct experience with the situation to be learned, 2) some feature of improved performance can be described simply and succinctly, and 3) the source is perceived as an authority figure qualified to deliver the feedback. Traditional feedback may be more useful in improving knowledge and specific skills because it simplifies the overwhelming number of variables involved in the actual experience.

The traditional model has some difficulties. As the learner's identity and experience increasingly ties them to the role of competent practitioner (Wenger, in press) and member in good standing of the community, traditional feedback may be perceived more as an insult (failure) rather than as an opportunity for learning. Traditional feedback may be rejected by the learner because the source is not seen as credible, or because it is perceived as inconsistent with a "known truth", or viewed as "nit-picking" or as insignificant (Gill et al., 1984; Bucher and Stelling, 1977). It is artificial compared to what will occur after graduation, when practicing physicians must self-assess accurately and then seek out knowledge in deficient areas. Traditional feedback may decrease the likelihood of developing these self-directed learning skills (Candy, 1991). This model of feedback requires direct faculty observation, which is both rare, and costly (Perkoff, 1986; Irby, 1995). Faculty may also have difficulty being succinct and specific while remaining supportive.

Learning to modulate processes as fundamental and ambiguous as interpersonal skills and self-awareness requires learners to expose their most fundamental attributions and take significant risk. As one gains experience, those areas where feedback is needed to improve performance become much more complex. The situated model is less threatening and more credible for improving relationships and complex skills. This is because evaluation is done internally by the learner (not by an external authority figure) and the messiness and uncertainty of the real situation replaces simplified objective standards. Focusing only on standards, and not on the processes and outcomes of real situations, masks those areas where the standards are inadequate or there are opportunities for further improvement.

The situated model of feedback also has its difficulties. Faculty must resist the temptation to tell and allow the learner to discover. Educators must also deal with the ethical dilemma of placing learners into situations requiring autonomous and responsible action for which they may not be ready. Explicitly dealing with the vagueness and uncertainty of situations may be stressful. Some learners, placed in this situation, may experience increased stress and burnout. In addition, there may be increased difficulty in satisfying institutional demands for assurance of quality medical care.
Faculty’s Role in Feedback

This theory of feedback stresses the faculty’s role as coach-mentor. Faculty members encourage learners to set and achieve higher goals than they could by themselves, and they help to troubleshoot when goals are not met. They provide guided reflection on the learner’s assessment of their own performance. This is important because it leads to the greatest gains in self-assessment skill (Gordon, 1991; Gordon, 1992). To accomplish this mentor role, faculty members need to establish a relationship of closeness and trust with the learner so that they can promote success.

Closeness and trust are established through mutual empathy, warmth and respect. They are also affected by the institutional structure (e.g., are mechanisms and time provided to establish closeness and trust?). Although evaluation of the learner is important, it is necessary in the initial stage of establishing the relationship to suspend any action based on judgment of the learner (Gazda, 1982). Closeness and trust are diminished by faculty’s arrogance, defensiveness, lack of commitment to learner’s growth and unwillingness to take risks with the learner (Keller et al., 1995).

Once closeness and trust are established, faculty can encourage learners to set the highest goal that they can achieve and are willing to try. In addition to these collaborative goals, and perhaps more importantly, other goals will emerge from the continual interactions between the learner and the medical environment. Faculty and learners can identify specific areas that are barriers to success, and can overcome the barriers through discussion, clarification, observation, practice or changes to the system.

Elaboration of the Theory

As an example of the appropriate application of the model, let us examine the faculty member’s role after observing a clinic visit with a patient suffering from alcoholism. If the learner has little life experience with alcoholism, and their skills seem rudimentary, a traditional model of feedback is useful. It would consist of a succinct statement and rationale pointing out specific behaviors which either added to or detracted from the interaction. Faculty would also suggest behaviors that might have improved the quality of the interview. They might then demonstrate the interview skills or arrange to let the learner practice the skills in a protected setting such as a role-play.

If the learner is a seasoned veteran with respect to these patients, the same strategy is unlikely to work. Concrete statements about the interaction behaviors may be discounted. The faculty opinions may be seen as irrelevant, superficial or judgmental. The most successful strategy is to establish closeness and trust by exploring feelings about alcoholism and avoiding arrogance or the appearance of “knowing it all”. Together, faculty member and learner can then safely examine assumptions about alcoholism and establish mutually agreeable standards for an interview. It is left to the resident to evaluate this interview relative to these standards. Communication channels are explicitly kept open and follow up is planned.

Recommendations

Many factors that affect learning must be kept in mind during the ambulatory teaching interaction. Medical students and residents come with a wealth of prior experience, previously established expectations and behaviors. These must be recognized and utilized. Basic physiologic needs may be unmet due to demanding schedules and this may interfere with their ability to process feedback.

Inexperienced learners do best when they receive clear definition of their role, the expected standards for performance and sound rationales for action (Bing-You and Stratos, 1995). A traditional model of feedback is often useful. Feedback that is descriptive, specific, timely, and based on first-hand observations should be given frequently. This should be linked to explicit goals and include suggestions for improvement and an action plan. Linking the feedback metaphorically to prior knowledge increases its value. Training programs should allow for demonstration or practice of basic skills when necessary.

Learners with more experience require some autonomy and responsibility. Normative feedback is often useful, and both models may be required. Useful techniques include case discussions, reflection on the actions of others and discussions of goals, needs and interests.

Many of the difficulties involved in feedback can be overcome by involving learners in the creation of standards and methods of feedback and involving them in self-reflection and evaluation. Feedback that comes from peers, provides peer comparisons or comes directly from the task may be less threatening and/or more credible (e.g., the feedback about patient communication that comes from exit interviews of patients rather than from faculty observations). Beyond this, the following specific steps are suggested:

1. Begin by using open ended questions and learner-centered questioning techniques to survey the learner-patient interaction.
2. Use additional targeted questions as needed to infer learner’s skill level, or make direct observations of skill performance.
3. First correct skill deficiencies through demonstration or practice.
4. If skills are proficient, focus on either knowledge or relationships.
5. Traditional feedback (observation, evaluation, and communication) is best used when focusing on knowledge.
6. Situated feedback (exploration of patient attributions, learner’s self-awareness, and contextual features during the interaction) is best used when focusing on complex skills and relationships.
Conclusions

The concepts of traditional and situated feedback are useful for structuring the most effective feedback based on the needs identified while exploring the learner-patient interaction.

The traditional model is characterized by faculty observation, comparison to a standard and communication of these results to the learner. It is used when focusing on knowledge and for inexperienced learners because it simplifies the overwhelming number of variables involved in the actual clinical experience.

Situated feedback is more credible when exploring relationships and for advanced learners. It consists of exploration of a patient’s experience of illness and the learner’s reaction to the patient, providing information about critical outcomes of clinical actions and attention to the contextual features that affect these areas.

Participants may be unaware of and confused by these distinctions. A head nod, meant by faculty as feedback affirming the suggested course of action, may be taken by the student as an ambiguous message and not feedback at all. A concrete statement to a resident such as “I wouldn’t confront him about that now” meant to convey a personal preference may be taken as an order and be seen as both useless and insulting. Attention to these models may help to resolve the perceptual differences about feedback in medical education and to optimize the learning experience.

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Reflections

A Model Rural H Interdisciplinary, Based Strategies

KENNETH E. OLIVE*, BI
Department of Internal Medicine
Community Health, East Tennessee
correspondence to: Kenneth E. O
University, Johnson City, TN 376
**Department of Public Health, i
and Graduate Nursing, Eastern F

Abstract. Introduction to Rural H Partnerships in Health Educati community oriented, and inquiry health students participated in ar students to deliver primary health intensive one-week course design care needs, and the process of w variety of community based activ the course objectives were met w that students regarded the team-m members indicated a high level o the extent to which community n

Key words: education, students, communication, rural health

The forces of social and e United States healthcare syst health care reform and the s reform issues as a major no and the implications for pro elements of change.

As a philanthropic org Kellogg Foundation identi of the current status of U.S